

# **Preliminary DRAFT Issaquah Creek Chinook Population - Tier I - Initial Habitat Project List** **Includes Potential Restoration and Protection Projects by Reach** **North Fork Issaquah Creek Reaches 1-3**

## **Reach 1: NF Issaquah from mouth to 64th St culvert**

### **Restoration**

#### **Technical Hypothesis:**

Project #	Reach #	NTAA #	NTAA Name & Description	Approx. Cost	Notes, Key Uncertainties	Benefits to Chinook H, M, L	Feasibil. H, M, L
I270	1	new	<b>Acquisition:</b> Purchase Bush Lane properties, 12.5 acres of Issaquah Creek and North Fork Issaquah Creek floodplain, located between confluence of these two stream and Darst Park (just north of I-90). Stream, riparian, and floodplain restoration on 1200 feet of Issaquah Creek east bank. Project could include stream and riparian restoration, side channel creation, and wetland restoration. Existing habitat is poor due to residential development.		Currently under private ownership, but is for sale. Property spans from Issaquah Creek to the North Fork. Issaquah Creek - Pickering Reach is located on opposite (west) bank, and a previous City restoration site is located just downstream. Site includes hardened banks and a confined channel that should be restored/revegetated. There is limited LWD in this reach. This is both a potential Corps project as well as a potential WSDOT mitigation site (\$1.1m).		
I271	1	Issaquah 8	<b>I-90 Stormwater Improvements:</b> I-90 has few water-quality treatment facilities or water detention/detention facilities for the hundreds of acres of impervious surfaces that flow directly into the East Fork, North Fork, and mainstem of Issaquah Creek. Work with Washington Department of Ecology and Washington State Department of Transportation to provide detention, water quality improvements and spill containment facilities. The risk of a major contaminant spill caused by highway accident is probably the greatest concern.		Requires participation by WSDOT who controls limited access right-of-way. Future TMDL/NPDES permit implications may help address some of these concerns. City of Issaquah estimates there are 85 acres of impervious surfaces in the I-90 ROW in the City alone.		
I272	1	new	<b>Increase Buffers and Restore Riparian Areas:</b> Explore opportunities to increase stream buffers and restore riparian vegetation throughout North Fork.		The portion of the North Fork that goes through the lower portion of Lakeside Property has highly impacted buffers and non-conforming uses in close proximity to the stream (e.g., semi-permanent trailer parking for Lakeside employees, with no sanitation facilities). The City and County, through mine pit permitting, will be addressing this with Lakeside.		
I273	1	new	<b>Protect/Restore Instream Flow:</b> Explore opportunities to protect and restore instream flow to North Fork. Low flows and fish stranding occurs in North Fork.		Any added flows need to have good water quality.		

**Protection**

**Technical Hypothesis:** Pool habitat and the habitat features that support the creation of pool habitat (LWD, riparian function, and channel connectivity) should be maintained.

Project #	Reach #	Exist. Prot. Priority (Y/N)	NTAA #	NTAA Name & Description	Approx. Cost	Notes, Key Uncertainties	Benefits to Chinook H, M, L	Feasibil. H, M, L
I274	1		new	<b>Acquisition:</b> Purchase Bush Lane properties, 12.5 acres of floodplain lying between Issaquah Creek and North Fork Issaquah Creek are currently for sale. Includes 1,200 feet of east bank of Issaquah Creek and 900 feet of North Fork Issaquah Creek. Site currently has degraded habitat (older residential area) that offers excellent potential for restoration. Adjacent to City-controlled 200-foot buffer on west bank of Issaquah Creek, and Darst Park on the south that extends to I-90 on Issaquah Creek and 62nd Street (East Lake Sammamish Trail) on North Fork. Stream/buffer enhancements can be combined with other public use of upland area of site, such as active recreation.	\$500k per acre	Property is for sale only as the entire 12.5-acre site. Currently under private ownership, but is for sale. Property spans from Issaquah Creek to the North Fork. Property is adjacent to City of Issaquah property. Much of the property is located in the 100 yr. Floodplain, and is therefore not at high risk for development. This is both a potential Corps project as well as a potential WSDOT mitigation site (\$1.1m).	<b>H</b>	<b>M</b>

**Reach 2: NF Issaquah from 64th St culvert to 66th St (beginning ravine)****Restoration**

**Technical Hypothesis:**

Project #	Reach #	NTAA #	NTAA Name & Description	Approx. Cost	Notes, Key Uncertainties	Benefits to Chinook H, M, L	Feasibil. H, M, L
I275	2	Issaquah 8	<b>I-90 Stormwater Improvements:</b> I-90 has few water-quality treatment facilities or water detention/detention facilities for the hundreds of acres of impervious surfaces that flow directly into the East Fork, North Fork, and mainstem of Issaquah Creek. Work with Washington Department of Ecology and Washington State Department of Transportation to provide detention, water quality improvements and spill containment facilities. The risk of a major contaminant spill caused by highway accident is probably the greatest concern.		Requires participation by WSDOT who controls limited access right-of-way. Future TMDL/NPDES permit implications may help address some of these concerns. City of Issaquah estimates there are 85 acres of impervious surfaces in the I-90 right of way in the City alone.		
I276	2	new	<b>Fish Passage Improvements:</b> Improve fish passage at the downstream end of wetland where a culvert is a partial barrier to fish passage at low water and near the Front St. interchange by reconfiguring the culverts under the road.		These culverts are undersized and have persistent sedimentation problems. New design should "cut the corner" and go directly into wetland rather than cross under road an additional two times as it currently is built.		
I277	2	new	<b>Wetland Revegetation:</b> Plant trees in the large wetland near the Front St. interchange to shade the creek as it flows through this section.				

I278	2	new	<b>Increase Buffers and Restore Riparian Areas:</b> Explore opportunities to increase stream buffers and restore riparian vegetation throughout North Fork.		The portion of the North Fork that goes through the lower portion of Lakeside Property has highly impacted buffers and non-conforming uses in close proximity to the stream (e.g., semi-permanent trailer parking for Lakeside employees, with no sanitation facilities). The City and County, through mine pit permitting, will be addressing this with Lakeside.		
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**Protection**

**Technical Hypothesis:** Pool habitat and the habitat features that support the creation of pool habitat (LWD, riparian function, and channel connectivity) should be maintained.

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	2			No projects identified at this time				

**Reach 3: NF Issaquah from 66th St (beginning ravine) to bottom of ravine****Restoration**

**Technical Hypothesis:**

Project #	Reach #	NTAA #	NTAA Name & Description	Approx. Cost	Notes, Key Uncertainties	Benefits to Chinook H, M, L	Feasibil. H, M, L
I279	3	new	<b>Reduce Sedimentation Problems:</b> Project would explore opportunities for reducing sedimentation problems related to the gravel plant. Possible to implement source control and also push for larger riparian buffers through the gravel plant property.				
I280	3	new	<b>Increase Buffers and Restore Riparian Areas:</b> Explore opportunities to increase stream buffers and restore riparian vegetation throughout North Fork.		The portion of the North Fork that goes through the lower portion of Lakeside Property has highly impacted buffers and non-conforming uses in close proximity to the stream (e.g., semi-permanent trailer parking for Lakeside employees, with no sanitation facilities). The City and County, through mine pit permitting, will be addressing this with Lakeside.		

**Protection**

**Technical Hypothesis:** *Pool habitat and the habitat features that support the creation of pool habitat (LWD, riparian function, and channel connectivity) should be maintained.*

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I281	3		new	<b>Headwater Wetland Protection:</b> Protect the valuable headwater wetlands in this basin.		An important issue in the North Fork watershed are the impacts of impervious surfaces on base flows and the lack of water in the wetlands. Explore regulatory, land use or stormwater mechanisms to improve recharge to the aquifer in the North Fork watershed.	<b>M</b>	<b>M/L</b>